5

ABSTRACT OF THE DISCLOSURE

The present invention is a method and apparatus that produces an estimate of the local oscillator (LO) frequency error using an external reference signal. The error estimate can be used for LO calibration, correction and other purposes. The present invention does not require the external reference signal to be a precision reference signal, nor does the present invention require that the reference signal be continuously supplied. Further, the present invention can be implemented exclusively in software, and therefore does not add to the size or weight of any device that it is resident in. Thus, the present invention can be added to microcontrollers and various specialized programmable digital ICs that were not initially designed for this task.